

# Health of Home and School.

LEAFLET NO. 30.

ISSUED BY THE STATE BOARD OF HEALTH OF MAINE

## Cases of Poisoning and What to Do.

The proper care of medicines for internal use and of liniments and other things for external application should be the rule and the practice in every home. All of these things, as well as poisons for rats and mice and all insecticides for domestic or agricultural use, should be plainly marked and kept in safe places.

The orderly care of all things which may have poisonous effects if improperly used is not only for the prevention of accidents and the saving of life, but the fact that death from some of the poisons from which accidents the most frequently occur is accompanied by the most agonizing and sometimes prolonged pain, should doubly emphasize the need of care in storing or keeping or handling these things. They should especially be kept beyond the reach of children.

## Treatment.

When poisoning has occurred send for the doctor at once and order him to come quickly and to bring what he needs in poisoning cases. If known, inform him what the nature of the poison is, otherwise there may be a regrettable delay in getting the proper antidotes or instrumental aid for the patient.

But begin work without waiting for the doctor to come, and get to work quickly. Generally the first thing to do is to give an emetic—make the stomach empty itself. Every minute counts, so use what may be had the most promptly.

If at hand, stir a tablespoonful of dry ground mustard into a quart of luke warm water.

If the mustard is not at hand, use the same quantity of common salt in a quart of warm water.

Force the patient to drink cupful after cupful of one of these mixtures; between whiles tickling the back of the throat with the finger or with a large stiff feather. Keep this up, the draughts to repletion and tickling the throat until plentiful vomiting occurs. If mustard or salt is not available, give the water without them; if warm water is not to be had right off, give cold water while water is warming. If clean water is not to be had on the instant, use water from the wash bowl or dish water or any water. The saving of life, not fastidiousness, is the order of the day. Repulsiveness may aid the emetic effect.

There are two exceptions to the general rule to give an emetic. When caustic alkalies or acid poisons have been taken do not give an emetic. Get their antidotes into the stomach as soon as possible.

The following are specific directions for the treatment of persons who have taken certain kinds of poisons or classes of poisons. For some of them the doctor will have better methods of treatment.

*Acids, sulphuric, nitric, muriatic or hydrochloric, acetic (does not include carbolic acid or prussic acid).*—Give an alkali in doses large enough to neutralize the acid, whichever can be obtained the most speedily—powdered chalk or magnesia in large draughts of water, or lime water, washing soda, or even soap or wood ashes. Then give milk, white of egg shaken up with water, olive oil, or thick smooth gruel. Do not give emetics.

*Alkalies, potash, soda, ammonia, lye, quick lime.*—Give water freely with vinegar, citric acid, or lemon or orange juice, or cider; then soothing drinks, such as white of egg and water, milk, gruel, or barley water.

*Aconite or aconitine.*—Emetic; hot strong coffee by mouth or enema as a stimulant; keep up the warmth of the body by warm appli-

cations, strictly maintaining the recumbent posture; artificial respiration if necessary.

*Alcohol, (grain or wood).*—Same treatment as for aconite. In poisoning from wood alcohol, aid its elimination by free sweating and by the administration of large quantities of water in which sodium bicarbonate has been dissolved.

*Ammonia water.*—See alkalies.

*Arsenic and its compounds; Fowler's Solution, Paris Green, London Purple, etc.*—Emetics; raw eggs beaten up with milk plentifully, or equal parts of oil (olive or linseed) and lime water, or milk with its cream, or magnesia freely.

*Belladonna, or atropine.*—Emetic; strong coffee or tea by mouth, or a pint as enema.

*Camphor.*—Same as belladonna.

*Carbolic acid, phenol.*—Give a tablespoonful of Epsom salts or Glauber's salts in a cupful of water, preferably warm. If either of these is not at hand use alcohol as an antidote. Apply alcohol full strength to external injuries from carbolic acid and as whiskey, gin or brandy diluted where carbolic acid has been swallowed. Use promptly and liberally whichever is available. Then white of egg in water plentifully. Do not give oils and do not try an emetic.

*Chloral hydrate.*—Same as aconite.

*Chloroform.*—Fresh air; artificial respiration.

*Coal Tar Remedies* for pain and fever, which are often constituents of patent medicines advertised for headache, colds, grippe, etc. (acetanilid, antifebrin, antipyrin, phenacetin). The symptoms are faintness, nausea, and perhaps vomiting and purging, pulse weak, sweating, paleness, cyanosis.—Emetic; keep patient lying down; coffee or aromatic spirits of ammonia; warmth to extremities.

*Cocaine.*—Emetic; strong tea or coffee; maintain respiration artificially if need be.

*Copper salts, blue vitriol, etc.*—Emetic; whites of eggs, half a dozen or more, strong tea or coffee.

*Corrosive sublimate, bichloride tablets or other salts of mercury.*—Same as copper.

*Creosote.*—Same as carbolic acid.

*Formaldehyde.*—A very weak solution of ammonia water.

*Gas, illuminating gas, poisonous fumes, choke damp, gas from charcoal stoves or gas stoves, water gas, carbonic acid gas, carbonic oxide, etc.*—Plenty of fresh air, open all doors and windows; artificial respiration to be kept up for a long time; hot strong coffee as enema.

*Gasoline, benzine.*—Same as alcohol or aconite.

*Hyoscyamus and hyoscyamine.*—Same as for belladonna.

*Iodine, tincture of iodine.*—Emetic; starch and water boiled as for starching clothing, a large quantity; white of egg freely.

*Lead Poisons, sugar of lead, etc.*—Emetic, large tablespoonful of Epsom salts or Glauber's salts dissolved in a cupful of water; then white of egg and water.

*Mushrooms, or poison from bad meat or fish.*—Emetic; ounce of castor oil, and enema if necessary to clear out the intestines; warmth to extremities.

*Opium, morphine.*—Emetic; strong coffee without milk by mouth or enema; rouse the patient and keep him in motion; if approaching collapse cease exercising him but begin and keep up artificial respiration. If obtainable, potassium permanganate, a quantity of about the size of one or two grains of wheat may be used several times dissolved in water.

*Oxalic acid.*—Chalk, lime or whiting in water given freely; even the whitewash from a wall, ceiling or fence may be used. Two tablespoonfuls of castor oil to clear the intestines, or an emetic may be given.

*Phosphorous, lucifer matches.*—Emetics; large tablespoonfuls of Epsom salts as a purgative. Do not give oil.

*Strychnine, nux vomica.*—Emetics; give powdered charcoal freely or a few drops of tincture of iodine at a time. Strong boiled tea; artificial respiration; the greatest possible quietude for the patient.

*Tobacco.*—Emetic; strong tea or coffee; keep up body warmth; quietude; artificial respiration if necessary.

# Health of Home and School.

LEAFLET NO. 32.

Issued by the State Board of Health of Maine.

## The Menace of Rats.

Plague is the most terrible of the pestilences which have afflicted man. It slays from 60 per cent to 90 per cent of those whom it attacks. In the 14th century it swept away 25,000,000 of the people of Europe. Within the last few years it has destroyed several millions of the people of India. The disease is now widely spread over the world. Just now New Orleans is waging a costly war against plague.

Plague is primarily a disease of rats, and secondarily a disease of man. From infected rats it is transmitted to human beings through the agency of fleas. Therefore, the most important work of guarding against plague, or stamping it out after it appears in a place, is the destruction of rats.

That rats bring plague and some other very serious diseases to mankind is sufficient reason why every community and every household should wage a ceaseless warfare against those rodents which are so dangerous and destructive and so filthy in their habits.

## How To Catch Rats.

Dr. W. C. Rucker, Passed Assistant Surgeon of the United States Public Health Service, who was the executive officer of the work which was carried on against plague in San Francisco, a few years ago, gives the following as the methods which were employed by the rat catchers who were in the employ of that service:

It is first to be remembered that the rat is a very wise animal and that the whole operation of trapping him is a test of wits between man and the rat.

Rats are to be found where there is an abundant food-supply for them. Therefore, the best places to catch rats are slaughter houses, meat markets, chicken houses, in and around garbage cans and places where garbage is usually placed. If the rat is deprived of this food-supply he will be attracted by the bait in the trap and thus enter it.

## Cage Traps.

The large nineteen-inch French wire cage trap has given very good results where rats are plentiful. It should be made of stiff, heavy wire and well reinforced, as a large, strong rat will force his head between the wires of a weak trap and thus escape. Before setting, the lever on the trap should be tested to see that it works properly. The trap should be placed on a hard surface with the rear end a little higher than the entrance so that the trap will close promptly. When setting the trap in the open it should be fastened to a board on which about an inch of soft dirt has been spread. Place the trap where the rat usually goes for food or in a run-way and disturb the surroundings as little as possible. It is sometimes well to place the trap near where there is dripping water, as the rats come there to drink. If the trap is set in hay or straw or wood, it should be covered (with the exception of the entrance) with this material. When this is not possible it should be covered with a piece of sacking or placed in a dark corner or beneath the floors. When setting the traps in the sewer, a dry place should be chosen.

The rat is more or less of an epicure; therefore, the bait should be changed at frequent intervals. Also, he should be given food which he is

not in the habit of getting, for example: In a meat market, vegetables are the best bait, while in a location where vegetables are plentiful, fresh liver and fish heads or a little grain are best. The following may be suggested as good bait to be used: Fish, fish heads, raw meat, cheese, smoked fish, fresh liver, cooked corn beef, fried bacon, pine nuts, apples, carrots and corn. When trapping in chicken yards a small chick or duckling is remarkably good. When a large number of rats are caught in one trap, search for the female and leave her alive in the trap, as she may call in the young or the males. The bait should be fastened to the inner side of the trap with a piece of fine wire, so that the first rat in cannot force the bait underneath the pan and thus prevent the entrance of other rats. A few grains of barley should be scattered near the entrance of the trap and a small piece of cheese or meat fastened to the pan with a piece of wire. It is often well to touch the pan with a feather which has been dipped in oil of anise or oil of rhodium. Before leaving the trap, it should be smoked with a piece of burning newspaper to kill the smell of the human hands or rats which have been in it. Do not handle the trap after burning it out. When trapping in a neighborhood where rats are known to exist, the traps should not be moved for three or four days unless they have rats in them, as it is well for the rats to become accustomed to seeing them and thus careless about entering. It is not wise to kill rats where they are caught, as the squealing may frighten the other rats away.

### Snap Traps.

Snap or spring traps are best for use in houses and stores, with the exception of fish and meat markets. Snap traps are best for use in runways, and on beams and shelves. It is sometimes well to disguise the trap by covering its floor with a little sawdust or dirt. They should be first tested to see that they work properly and that the staples are secure. New traps should be smoked or stained to render them an inconspicuous color.

The bait should consist of some firm material such as fried bacon or tough meat and should be tied on so that the rat will be obliged to pull on it, and thus spring the trap. The trap should be placed in a corner or close to the wall on a flat, hard surface so that the rat cannot spring it with his tail or by walking on it.

### Barrel Traps.

In warehouses and granaries large numbers of rats may frequently be trapped by using a barrel or garbage can having a metal top which is carefully balanced. Large pieces of strong cheese are placed in the middle of the cover and a plank laid from the floor to the edge of the barrel. The rat runs up the plank onto the smooth metallic lid, which tips, and the rat is precipitated into the barrel.

In Fig. 1 is shown a snap trap of excellent design. The spring is released either by an upward nibble, or a slight downward pressure. Fig. 2 represents a trap which need not be baited. Set in the runways of rats, it is sprung by a very slight touch.

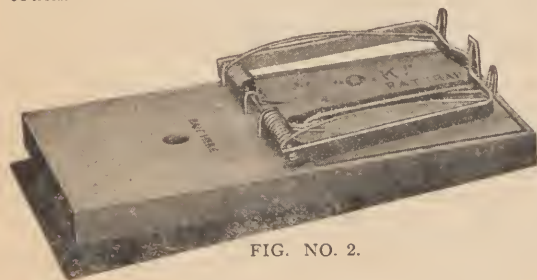


FIG. NO. 2.



FIG. NO. 1.